

Carotid Artery Program Transcript

The figure on the left is a diagram of the blood supply to the head and neck. It begins off the subclavian in the root of the neck with the vertebral and branches off and thyrocervical trunk. We then proceed cranially to the common carotid, which gives off an internal carotid to the brain and the external carotid basically to the head.

Off of the external carotid, we see a superior thyroid artery, then there is the lingual to the tongue, the facial to the face region, and then, further upward, there is the maxillary and the superficial temporal. The maxillary is the main blood flow to the muscles of mastication, to the upper and lower teeth, to the palate, and even provides blood to the meninges of the brain. The maxillary is divided into three parts by the lateral pterygoid, with the second part giving rise to blood vessels to the muscles of mastication, the first part to the lower teeth, and the third part to the palate and upper teeth.

The figure on the right shows the maxillary arteries superimposed on the skull. And you can see the inferior alveolar artery going downward through the mandible and giving blood supply to the teeth. See the middle meningeal going upward to the bone meninges of the brain.

As we go anteriorly, we come to the second part of the maxillary artery, with branches to the muscles of mastication. There's a deep temporal, there's a masseter, and there are also pterygoid branches. Then we go into the third part, and here we have the branches to the upper teeth as well as the greater and lesser palatine branches to the hard and the soft palate.